 AIR RESOURCES BOARD	IVECO N.V.	EXECUTIVE ORDER U-R-015-0057 New Off-Road Compression-Ignition Engines
---	------------	---

Pursuant to the authority vested in the Air Resources Board by Sections 43013, 43018, 43101, 43102, 43104 and 43105 of the Health and Safety Code; and

Pursuant to the authority vested in the undersigned by Sections 39515 and 39516 of the Health and Safety Code and Executive Order G-02-003;

IT IS ORDERED AND RESOLVED: That the following compression-ignition engine and emission control system produced by the manufacturer are certified as described below for use in off-road equipment. Production engines shall be in all material respects the same as those for which certification is granted.

MODEL YEAR	ENGINE FAMILY	DISPLACEMENT (liters)	FUEL TYPE	USEFUL LIFE (hours)
2004	4VEXL12.9VGT	12.9	Diesel	8000
SPECIAL FEATURES & EMISSION CONTROL SYSTEMS			TYPICAL EQUIPMENT APPLICATION	
Direct Diesel Injection, Turbocharger, Charge Air Cooler, Electronic Control Module			Harvester, Combine	

The engine models and codes are attached.

The following are the exhaust certification standards (STD) and certification levels (CERT) for hydrocarbon (HC), oxides of nitrogen (NOx), or non-methane hydrocarbon plus oxides of nitrogen (NMHC+NOx), carbon monoxide (CO), and particulate matter (PM) in grams per kilowatt-hour (g/kw-hr), and the opacity-of-smoke certification standards and certification levels in percent (%) during acceleration (Accel), lugging (Lug), and the peak value from either mode (Peak) for this engine family (Title 13, California Code of Regulations, (13 CCR) Section 2423):

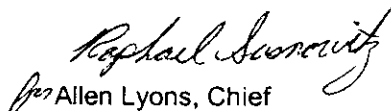
RATED POWER CLASS	EMISSION STANDARD CATEGORY		EXHAUST (g/kw-hr)					OPACITY (%)		
			HC	NOx	NMHC+NOx	CO	PM	ACCEL	LUG	PEAK
225 ≤ kW < 450	Tier 2	STD	N/A	N/A	6.4	3.5	0.20	20	15	50
		CERT	--	--	5.9	0.9	0.14	7	3	11

BE IT FURTHER RESOLVED: That for the listed engine models, the manufacturer has submitted the information and materials to demonstrate certification compliance with 13 CCR Section 2424 (emission control labels), and 13 CCR Sections 2425 and 2426 (emission control system warranty).

Engines certified under this Executive Order must conform to all applicable California emission regulations.

This Executive Order is only granted to the engine family and model-year listed above. Engines in this family that are produced for any other model-year are not covered by this Executive Order.

Executed at El Monte, California on this 27TH day of August 2004.


 Allen Lyons, Chief
 Mobile Source Operations Division

ATTACHED Pg 1 of 1

5/27/04

U-R-015-0057

LARGE ENGINE MODEL SUMMARY

Manufacturer: IVECO N. V.

Process Code: New Submission

EPA Engine Family: 4VEXL12.9VGT

Manufacturer Family Name: NA

1.Engine Code	2.Engine Model	3.BHP@RPM (SAE Gross)	4.Fuel Rate: mm/stroke @ peak HP (for diesel only)	5.Fuel Rate: (lbs/hr) @ peak HP (for diesels only)	6.Torque @ RPM (SEA Gross)	7.Fuel Rate: mm/stroke@peak torque	8.Fuel Rate: (lbs/hr)@peak torque	9.Emission Control Device Per SAE J1930
F3BE0681A*B001	F3BE0681	532@ 1900	295	NA	1733@1000	335	NA	DDI, TC, CAC, ECM
F3BE0681U*B151	F3BE0681	493@1900	265	NA	1623@1000	306	NA	DDI, TC, CAC, ECM
F3BE0681S*B151	F3BE0681	449@2100	225	NA	1475@1100	273	NA	DDI, TC, CAC, ECM
F3BE0681T*B151	F3BE0681	405@2100	205	NA	1365@1100	253	NA	DDI, TC, CAC, ECM
F3BE0681R*B151	F3BE0681	519@1900	279	NA	1623@1000	306	NA	DDI, TC, CAC, ECM